



MARSHALL STAR

Serving the Marshall Space Flight Center Community

April 1, 2004

NASA and Louisiana officials sign agreement for National Center for Advanced Manufacturing in New Orleans

By Lynnette Madison

Marshall Center Director David King joined Louisiana Gov. Kathleen Blanco and New Orleans Mayor Ray Nagin in the signing of a five-year extension to a Memorandum of Understanding last Friday in New Orleans.

The original agreement provided for a joint investment of more than \$50 million to promote the growth of a technologically trained aerospace workforce, job creation, and world-class manufacturing capabilities in Louisiana.

The National Center for Advanced Manufacturing Initiative serves as a principal resource for NASA's aerospace manufacturing research, development, and innovation needs that are critical to the goals of the Agency.

The extension of the memorandum continues the National

See Agreement on page 2

'Green chemistry' offers new potential for microgravity processes

Ionic liquids expert to speak at Marshall April 8

by Marc Pusey

There is new potential for conducting experiments and other processes in the microgravity environment of a spacecraft or space station using "green chemistry" with ionic liquids.

Known as "green solvents," ionic liquids could mean safer and environmentally friendly missions for explorers as NASA

See Green chemistry on page 4

Marshall Deputy Geveden, NASA experts to discuss Gravity Probe-B mission

NASA Headquarters release

Marshall Deputy Director Rex Geveden and other NASA experts will discuss the Gravity Probe-B launch, spacecraft, and mission objectives at noon CST Friday at NASA Headquarters in Washington, D.C.

NASA TV will carry the briefing live.

The briefing will cover the origins,

experimental methods, technology, mission operations, and science of Gravity Probe-B. The mission will test two important predictions of Albert Einstein's general theory of relativity.

The 18-month mission is scheduled for launch April 17 at 12:09 p.m. CDT, from Vandenberg Air Force Base, Calif., on board a Boeing Delta II launch vehicle.

Briefing participants include:

- Anne Kinney, director, Astronomy/Physics Division at NASA Headquarters
- Rex Geveden, Gravity Probe-B program manager and deputy director of the Marshall Center
- Francis Everitt, principal investigator for Gravity Probe-B at Stanford University

See Gravity Probe-B on page 2



Courtesy photo

Marshall Center Director David King, left, joins Louisiana Gov. Kathleen Blanco, center, and Dr. William Jenkins, president of Louisiana State University Systems, in signing a five-year extension to a Memorandum of Understanding on March 26 in New Orleans.

X-43A hypersonic flight successful

Dryden Flight Research Center release

NASA's second X-43A hypersonic research aircraft flew successfully Saturday — the first time an air-breathing scramjet-powered aircraft has flown freely.

The unpiloted vehicle's supersonic combustion ramjet, or scramjet, ignited as planned and operated for the duration of its hydrogen fuel supply, which lasted about 10 seconds. The X-43A reached its test speed of Mach 7.

"It's been a great, record-breaking day," said Larry Huebner,

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Agreement

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Center for Advanced Manufacturing's Louisiana partnership. The partnership is a joint venture between NASA, the University of New Orleans and Lockheed Martin Space Systems of New Orleans to work jointly on research, development and test activities to meet future space systems needs. It is housed at NASA's Michoud Assembly Facility in New Orleans.

This agreement builds on the existing strengths and resources within NASA — both at the Marshall Center and at the Michoud Facility — and at the University of New Orleans. The partnership serves as a national resource for research and development and enables the transfer of technology to industry partners and educational institutions. The agreement

calls for collaboration in manufacturing research, development, testing and evaluation to assure the best use of scientific and engineering capabilities and facilities.

The National Center for Advanced Manufacturing in Louisiana, originally formed in March 1999, is a joint undertaking among government, academia and industry to fulfill the technology needs of aerospace and strengthen U.S. competitiveness in aerospace and commercial markets.

This agreement is focusing its current research on such technologies as:

- Friction Stir Welding, a fastening technique that produces high-strength, defect-free joints and can uniformly weld materials that are otherwise difficult to join;

- Advanced fiber placement, a technique used in building large, complex-shaped structures composed of composite materials; and,

- Non-destructive evaluation systems, used to determine a product's quality without destroying it.

The center sponsors a consortium of six universities conducting research with a primary focus on advanced materials and manufacturing technologies in the production of aerospace structures.

The Michoud Assembly Facility is one of the world's largest manufacturing plants and includes a port facility with deepwater access for the transportation of large space structures, such as the Space Shuttle's External Tank, which is assembled there.

The writer, an employee of ASRI, supports the Media Relations Department.

Gravity Probe-B

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in Stanford, Calif.

- Brad Parkinson, co-principal investigator for Gravity Probe-B at Stanford University
- Kip Thorne, Feynman professor of theoretical physics at the

California Institute of Technology in Pasadena, Calif.

For more information about Gravity Probe-B, go to <http://einstein.stanford.edu> or <http://www.gravityprobeb.com>.

X-43A

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Hyper-X propulsion lead at Langley Research Center in Hampton, Va., after the successful test flight. "We achieved positive acceleration of the vehicle while we were climbing, and maintained outstanding vehicle control. This was a world-record speed for air-breathing flight."

The flight, originating from NASA's Dryden Flight Research Center in Edwards, Calif., began at 2:40 p.m. CST, as NASA's B-52B launch aircraft carrying the X-43A lifted off the runway. The X-43A, mounted on a modified Pegasus booster rocket, was launched from the B-52B just before 4 p.m. The rocket boosted the X-43A to its test altitude of about 95,000 ft. over the Pacific Ocean, where the X-43A separated from the booster and flew freely for several minutes following scramjet engine operation, in order to gather aerodynamic data.

"(It) was a grand-slam in the bottom of the 12th," said Joel Sitz, X-43A project manager at Dryden. "It was fun all the way to Mach 7. We separated the research vehicle from the launch vehicle, as well as separating the real from the imagined."

Langley Research Center and Dryden Flight Research Center jointly conduct the Hyper-X program. ATK GASL (formerly MicroCraft, Inc.) in Tullahoma, Tenn., built the vehicle and the engine, and Boeing Phantom Works in Huntington Beach, Calif., designed the thermal protection and onboard systems. The booster was built by Orbital Sciences Corp in Chandler, Ariz.



Photo by Doug Stoffer, NASA/Marshall Center

King, Geveden prepare for race challenge

Marshall Director David King, right, and Deputy Director Rex Geveden, prepare for the May 31 Cotton Row Run in Huntsville. King and Geveden have challenged each other to form separate teams to compete in the race. The team of three-to-five members with the lowest cumulative time will win. Marshall team members who would like to join either King's or Geveden's team should contact James Burnum at 544-4008 for more information. For more information on the Cotton Row Run, go to http://www.huntsvilletrackclub.org/HTC_Races/crr/crr04ind.htm.

James H. Carter named director of Center Operations

by Grant Thompson

James H. Carter has been named director of the Center Operations Directorate at the Marshall Center.

Carter, deputy director of Center Operations since 1999, is now responsible for all institutional services at Marshall. With more than 225 specialized civil service and 1,600 contract employees, the Center Operations Directorate's services include environmental engineering, information systems, logistics, facility maintenance and operations, technical information and operations, protective services, occupational medicine and food services.

Prior to joining NASA in 1999, Carter spent 27 years with the U.S. Army Corps of Engineers, most recently as chief of the

Construction Operations Readiness Division in St. Louis, Mo. There he directed a wide range of civil works projects including the civil works construction program and readiness and regulatory programs. Prior to assuming that position in 1998, he was acting deputy chief of the Construction Operations Readiness Division at Corps headquarters in Washington, D.C.

Carter began his government career in



Carter

Marshall Imaging Services

1972 with the Army Corps of Engineers as a civil engineer in its Vicksburg, Miss., District. He moved on to the Fort Worth (Texas) District, filling positions of increasing responsibility, including area engineer in 1989, and chief of the engineering division in 1995.

Carter earned his bachelor's degree in civil engineering from Louisiana State University, Baton Rouge, La., in 1972, and his master's degree in civil engineering from Louisiana Tech University, Ruston, La., in 1986.

Carter and his wife, the former Sue Bullock, have three children and reside in Huntsville.

The writer, an employee of ASRI, supports the Media Relations Department.

Marshall's Chip Dobbs receives two honors for community service

by Jonathan Baggs

Marshall team member Chip Dobbs has been honored twice in as many months for contributions he's made as a role model in helping people achieve goals in spite of disabilities.

In February, Dobbs received the Outstanding Alumnus in Business Award from the Athens State University Alumni Association. The Greater Alabama Council of Boy Scouts of America, at its annual March recognition banquet in Birmingham, also honored him with a Silver Beaver Award.

An industrial property management specialist in the Marshall Center's Logistics Services Department of the Center Operations Directorate, Dobbs said both recognitions came as a surprise. He's proud to have been selected. "It shows that people with disabilities can be an equal contributor to society and to their community," he said.

Athens State University's Outstanding Alumnus in Business Award is given to business graduates of the school who have distinguished themselves in their work and community.

"Chip is the perfect example of an Athens State success story," said Rick Mould, dean of university relations at the school. "He is a distinguished member of the Marshall team and has made a tremendous impact in the lives of others."

Dobbs has twice been selected by Alabama governors to serve on the board of trustees at the Alabama Institute for the Deaf and Blind in Talladega.

His work with the deaf and blind carries over to Boy Scouting. Dobbs remembers going to camp and "having fun" as a Scout, but the lack of programs for people with disabilities later motivated him to get more involved. He's been active in Scouting since 1972.

"As an adult, I wanted to help disabled Scouts get the full experience that Scouting has to offer," Dobbs said. "I wanted to help them achieve a full life."

For his contributions, Dobbs was one of 26 recipients of the Silver Beaver Award this year from North Alabama. The award is given for "noteworthy service of exceptional character above and beyond normal duty" and is the highest award bestowed on volunteers.

Dobbs said he wants to give back to the community. "Anyone can help make a difference," he said. "A disability shouldn't get in the way of living a full life and achieving whatever goals someone sets for themselves."

The writer, an employee of ASRI, is the Marshall Star editor.



Courtesy photo

Chip Dobbs, right, receives the Athens State University Alumni Association's Outstanding Alumnus in Business Award from Bill Bass, an alumni board member and retired deputy director of the Marshall Center's Microgravity Science Division in the Space Sciences Laboratory.

Sweat for a good cause!

Volunteers needed by April 9 for Space Station water recovery testing

From the Flight Projects Directorate

Civil service volunteers are needed to support testing of the International Space Station Water Recovery System. The Marshall Center's Environmental Control and Life Support Branch is conducting the testing to qualify the system design. Testing will begin in June and go through December.

Volunteers are needed to generate sweat and other wastewater, which will be processed by the Water Recovery System. One-hour exercise sessions using treadmills, an elliptical machine, Stair-Stepper, rowing machine and a stationary bicycle will be followed by collection of wastewater.

Participation during normal work hours has been approved, as well as compensatory time for participation outside of normal work hours.

Volunteers must obtain approval from supervisors and be a full-time Marshall civil service employee. The number of times a volunteer participates in test activities each week will be based on their availability as coordinated with their supervisor.

All volunteers will be approved by a Marshall Medical Center



Emmett Given, NASA/Marshall Center

Aerospace technology group visits Marshall

Tom Taylor, right, president of Global Outpost Inc. of Las Cruces, N.M., examines a "foam test coupon." Marshall team member Scotty Sparks, second from left, explains Return to Flight processes regarding cryogenic insulation to members of the Aerospace Technology Working Group. The group recently held a national meeting in Huntsville and visited some Marshall facilities. Chartered by NASA Headquarters in 1990, the group is a technical forum with the purpose of facilitating open dialogue between government, industry and academia on advanced space technology issues and opportunities.

physician based on their most recent annual physical exam and a treadmill test.

For more information or to volunteer, call Paul Wieland at 544-7215 or e-mail Paul.O.Wieland@nasa.gov by April 9.

Green chemistry

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pursues the Vision for Space Exploration.

One of the leading researchers in the field of ionic liquids, Dr. Robin Rogers, director of the Center for Green Manufacturing at the University of Alabama at Tuscaloosa, will speak at the Marshall Center at 3 p.m. April 8 in Bldg. 4481, Room 107. All Marshall team members are invited.

Rogers' talk will focus on ionic liquids, their properties, and how these properties may be used to meet NASA's human space exploration needs.

Rogers is the editor of several journals, and has served as editor for several books on ionic liquids. For more information on the seminar, call Lori Lewis at 544-2910.

Ionic liquids may be ideal for any solvent-based process used in space-based research, not only for conducting experiments, but for processes including carbon dioxide removal, oxygen recovery, waste treatment, thermal transfer, organic synthesis and electrochemical applications.

Ionic liquids have a number of

properties that make them appealing for microgravity use. As salts, they have very little vapor pressure, so they will not evaporate. In liquid form they have a viscous or syrupy consistency, so they do not readily splash. They are thermally and electrically conductive, generally have a liquid range of around 572 F (300 C), and can be used as a lower temperature range heat transfer fluid. They are typically not very flammable, and have high thermal stability. Most importantly, their solvation properties can be "tuned" through modifications to their structure, which is almost infinite, thus earning them the additional title of designer solvents.

So what are Ionic liquids? Imagine sodium chloride — common table salt — heated to 1,472 F (800 C) so it melts to form a liquid. This would be a molten salt, or ionic liquid, and in this state it has a number of uses. However, these temperatures are not compatible with organic compounds.

Now, imagine a can of paint, and the odors associated with it as it is used. These odors are due to volatile organic com-

pounds — organic solvents — which account for roughly 70 percent of today's industrial pollution.

Finally, imagine a class of solvents with the benefits of molten salts that can be used at room temperatures and have more precisely adjustable solvation properties than organic solvents — all without high temperatures or noxious odors (volatility). This is the world of ionic liquids, a class of organic compounds that lately has taken the world of organic chemistry by storm as it struggles to accommodate today's green, or environmentally friendly, needs for industrial processes.

While most ionic liquid research today is in the field of organic chemistry, they are also finding applications in biocatalysis, biomass processing, selective metal ion extraction, pollution remediation and ore refining.

The writer works in the Microgravity Science and Applications Department of the Marshall Center's Science Directorate.

Utility Control System 'brain' behind Marshall environment

Facilities Engineering Department system maintains variety of processes at Center

By Norm Hawes

Have you ever thought about your office environment and how you stay cool in the summer and warm in the winter?

Hidden away in the Marshall Center's Facilities Engineering Department for the past 25 years is the Utility Control System, commonly referred to as UCS.

With the hum of the UCS Building Automation System in the background, operators monitor and control the Center's environment 24 hours a day, seven days a week.

The Utility Control System also monitors water levels, water quality, air quality, weather, hydrogen levels, oxygen levels, humidity levels, water usage, steam usage, electricity usage, boilers, chillers, refrigerators, freezers, and the full gamut of instrumentation connected to a multitude of air handlers scattered throughout Marshall Center buildings. In all, the system monitors or controls about 3.5 million square feet of environment in more than 100 buildings and is connected to more than 15,000 field devices.

In many buildings, additional user-defined equipment can



Marshall team members Doug Faust, left, and Harry Powell operate controls in the Utility Control System at the Center. Both are employees of Mainthia Technologies Inc.

Photo by David Higginbotham, NASA/Marshall Center

easily be connected to the Utility Control System Building Automation System to monitor and control equipment and processes around the clock. There is no charge for this service.

The capability of the UCS is enormous and can easily trend and log data as well as provide historical information in the form of charts and graphs on equipment or processes.

Among other services that UCS personnel provide is Facilities Engineering Department help-desk

support during non-core hours, energy reports, monthly utility bill verification, and HVAC color floor plan drawing files. Future plans for the Utility Control System include desktop computer Web access for viewing data pertaining to buildings, equipment or processes.

For more information, e-mail Norm Hawes at norman.d.hawes@nasa.gov.

The writer is the Marshall Center's Utility Control System program manager.

Procurement Office holds annual awards celebration

by Elaine Hamner

The Marshall Center's Procurement Office recently held its annual awards luncheon to honor employees for outstanding accomplishments.

This year's award theme was "Procurement – A Galaxy of Stars." Following remarks by Marshall Associate Director Axel Roth, Procurement's team members participated in a production of star-themed poetry and songs paying tribute to the past, present and future. The Procurement Office also remembered the Columbia STS-107 crew with a special program.

Awards were presented in categories that included the Peer Honor Award – presented to a person recognized by peers for his/her outstanding contributions to the Procurement Office.

Ten award winners were nominated for

the annual NASA-wide Procurement Awards administered by the Office of Procurement at NASA Headquarters in Washington. Selection of Marshall's nominee, Robert Champion, as the Agency's Contracting Officer's Technical Representative of the Year, was announced at the Procurement Office Training Conference in December.

The following team members were recognized with Procurement Office awards:

- Procurement Support Person of the Year – David Brock
- Procurement Analyst of the Year – Jerre Burgreen
- Simplified Acquisition Specialist of the Year – Eunice Adams
- Midrange/Commercial Persons of the Year – Vanessa Lindsey and Brian Speer

• Grants Specialist of the Year – Bobby Holden

• Contract Specialist of the Year – Dan Fuller

• Contract Manager of the Year – Roxanne Melton

• Supervisor of the Year – Jerry Williams

• COTR of the Year – Robert Champion. Receiving Honorable Mention were Joyce Eagan and Steve Newton

• Peer Honor Award – Jan Matthews. Receiving Honorable Mention were Bob Martin and Terry Wilkinson

Marshall Procurement Director's Certificates also were presented to employees.

"Going the Extra Mile" certificates went to James Bailey, Jackie Byrnes,

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Procurement

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Kimberly Daniels, Monica Heidelberg, Kathy Huskey, Vanessa Lindsey, Robert Martin, Betty McCown, Lynn Southgate and Bryan Williford.

Receiving certificates for "Practicing Good Values" were Teresa Foley-Batts, John Busbey, Vann Jones, Sherry Landers, Debbie Matthews, Brian Speer, Anna Stovall, Monica Williams and Alfreda Zackery.

"Good Attitude" certificates were given to Tamera Balch, David Brock, Paula Carden, Sherry Davidson, Daniel Fuller, Betty

Kilpatrick, Okoro Leslie, Jannifer Matthews, David Morgan, Steve Morris and Pamela Napolitano.

Janice Burrough, Kellie Craig, Becky Crane, Keshia Guinn, Marty Hanson, Joseph Hobson, Isaac Jones, Jennifer McCaghren, Mike Sosebee, Jeanette Swearingen and Michael Sweigart were recognized for "Dangerous Display of Initiative."

"Safety Awareness" certificates were given to Gloria Coffey, Ron Smith and Stephen Stewart.

The writer is the assistant to the Marshall Center's director of procurement.

Obituaries

Alpha R. Bond, 80, of Huntsville, died March 18. A memorial service was held at Grace Lutheran Church in Huntsville. A memorial service and internment of his cremated remains was March 21 in Indiana.

Bond was born July 14, 1923 in Elberfeld, Ind., to William "Bill" Henry Bond and Gyneth Schultz Bond. He served as a weather forecaster at bases that trained pilots in the U.S. Army Air Corps during World War II and for the U.S. Air Force during the Korean War -- eventually attaining the rank of captain. He graduated from Purdue University with a degree in



mechanical engineering in 1948. He worked for Goodyear Tire & Rubber Co. in Akron, Ohio, and later worked as a flight test engineer for McDonald Aircraft Co., Douglas Aircraft Corp. Bond came to Huntsville in 1960 to work for the Marshall Center on flight

engine development. He retired from Marshall in 1981 as AST, technical management.

Bond is survived by his wife, Antonia Maresh Bond; one son, Robert William Bond of Madison; and three brothers, Carl Henry Bond, Ralph William Bond and James Lee Bond, all of Evansville, Ind.

Michael P. Driscoll, 81, of Huntsville, died Feb. 24. He retired from the Marshall Center in 1983 as a model maker in the S&E organization. He is survived by his wife, Katherine C. Driscoll.

Special thank you

On behalf of our entire family, heartfelt appreciation is expressed to our friends and colleagues at the Marshall Center for the cards, prayers and condolences conveyed to the family over the recent death of our father and our mother's illness. Your outpouring of kindness has meant so much, and your generous expressions of concern have touched our hearts, our mother and our entire family. Thank you.

— **Laura L. Groce/CD70**
— **Susan E. Hartman/SD01**
— **The family of Mr. And Mrs. Joseph Robert Groce, Sr.**

Retired federal employees to meet April 10

The National Association of Retired Federal Employees will meet at 9:30 a.m. April 10 at the Senior Center on Drake Avenue in Huntsville. Bill Boulton of The Land Trust of Huntsville and North Alabama will speak. For more information, call 881-4944 or 882-2406.

Job Announcements

MS04C0095, Senior Executive Service (SES), Director, Space Transportation Directorate. ES-0801-01, 06 (promotion potential to ES-6). Closes April 14. Contact: Diedra Williams at 544-5721.

MS04D0096, AST, Flight Vehicle Atmospheric Environments. GS-0861-14, Space Shuttle Propulsion Office, Propulsion Systems Engineering & Integration Office. Closes April 1. Contact: Edwina Bressette at 544-8115.

MS04D0099, AST, Advanced Propulsion Technologies. GS-0861-13, Space Transportation Directorate, Advanced Planning and Concepts Office, Concept Definition Group. Closes April 7. Contact: Jannette Black at 544-8660.

MS04D0107, AST, Heat Transfer. GS-0861-11, 12 (promotion potential to GS-13), Engineering Directorate, Structures, Mechanics and Thermal Department, Thermodynamics and Heat Transfer Group. Closes April 6. Contact: Kevin Plank at 961-0157.

MS04C0108, AST, Mission Operations Integration. GS-0801-15, Flight Projects Directorate, Payload Operations and Integration Department, Payload Operations Director's Office. Closes April 5. Contact: Carolyn Lundy at 544-4049.

MS04C0110, AST, Aerospace Flight Systems. GS-0861-15, Space Shuttle Propulsion Office, External Tank Project. Closes April 5. Contact: Edwina Bressette at 544-8115.

Announcements

Associate Administrator Loston to speak at scholarship banquet

Dr. Adena Williams Loston, NASA's associate administrator for education, will be the keynote speaker at the 11th Annual Scholarship Banquet sponsored by the North Alabama Chapter of the National Society of Black Engineers, Thursday, April 1, at the Huntsville Marriott, beginning at 6:30 p.m. For tickets, contact any NSBE member or call Shanell Darby, 544-6197, or Lamont Redrick, 461-3549.

'Take Our Children to Work Day' set for April 22

The annual "Take Our Children to Work Day" at the Marshall Center for children in grades 3-12 will be April 22. T-shirts for the event must be ordered by April 9 with payment made to the Marshall Exchange. Deadline to register children to participate in the event is April 16. Since 1994, the event has been an opportunity for the Marshall team to promote education and awareness of the space program. See "Inside Marshall" for a Web link detailing registration, workshops, tours and other information, or go to <http://inside.msfc.nasa.gov/CHILDREN/>.

Marshall annual Egg Hunt will be April 10

The Marshall Center's annual Egg Hunt will be at 10 a.m. April 10 in the Picnic Area. Registration is at 9:30 a.m. All Center team members are invited to bring their children ages 12 and under to participate. In case of inclement weather, activities will be held in Bldg. 4316. Marshall team members must register any family members in the Visitor Management System who will not be attending with a badged employee. To register a non-badged family member, go to http://co.msfc.nasa.gov/ad50/visitor_manage.html. For details, call 544-3563 or 544-1382.

For more Announcements, see "Inside Marshall"

Marshall Wellness Center annual 5K Run set April 28

The Marshall Wellness Center's second annual 5K Run will be April 28. The run, open to all Marshall team members and retirees, will begin at Bldg. 4315 at 4 p.m. For more information, call Heather Day at 544-9355.

MARS Tennis Club seeking members

The MARS Tennis Club is seeking members for the 2004 season. Civil servants, retirees and on-site contractors are eligible for membership, which includes use of four lighted tennis courts, participation in tournaments and other club activities. For details, call Amy Hemken at 544-70972004

Marshall Medical Center Part I physical exam cancellations

The Marshall Medical Center asks that employees cancel scheduled Part I physical examination appointments in the case of illness, as samples collected may be skewed and could result in further unnecessary testing. For details, call 544-2390.

Tickets available for 26th Annual UNCF Banquet

The 26th Annual United Negro College Fund Banquet will be Thursday, April 8, at 6:30 p.m. in the Von Braun Center North Hall. Former Illinois Sen. Carol Moseley Braun will speak. Tickets are \$100. For details, call Chanel Leslie, 544-3740.

Astrionics instrumentation lab retirees to meet Tuesday

Retirees and friends of the Instrumentation Division of the Astrionics Lab will be at 11 a.m. Tuesday at the Redstone Golf Course coffee shop. For details, call Tom Escue at (256) 232-1549.

LIFESouth blood drive is April 9

ALIFESouth blood drive will be 8 a.m.-1:30 p.m. April 9 at the Marshall Center Activities Bldg. 4316. For more information, call Rick Wallace at

544-8885 or see "Inside Marshall."

MARS softball league seeking players; meeting Thursday

An organizational meeting for the MARS softball league will be at noon Thursday in Bldg. 4203, Room 1201. All team managers and interested players should attend. The league is seeking players -- Marshall civil servants, on-site contractors, approved off-site contractors and family members -- to participate in the two softball divisions. Division A is for intermediate, skilled and competitive players. Division B is for beginners, intermediate and skilled players and is a co-ed division requiring a minimum of two females on the field during play. Games are played Monday-Thursday at either 5 p.m. or 6 p.m. Teams typically play one game each week. The season begins May 4. For details, call Jim Lomas at 544-8305 or Victor Pritchett at 544-5771.

MARS Tennis Club Doubles Tournament will be Saturday

AMARS Tennis Club Hi-Lo Closed Doubles Tournament will be at 8:30 a.m. Saturday with warm-up at 8 a.m. Only MARS Tennis Club members can participate. For information, call Ronda Moyers at 544-6809.

Procurement Office retirees to meet Tuesday

Procurement Office retirees will meet for breakfast at 9:30 a.m. Tuesday at Mullins Restaurant on Andrew Jackson Way in Huntsville. For details, call Carl Melton at 837-5604.

Facilities Office breakfast for employees, retirees to be April 13

Employees, retirees and friends of the Marshall Center Facilities Office will meet at 8 a.m. April 13 at Shoney's on Memorial Parkway and University Drive in Huntsville. For details, call Carl Gates at 232-2695.

Classified Ads

Miscellaneous

- ★ MARX trains 1940s "Bell Ringing Signal." Unused, original box w/insert. \$30. MARX transformer, \$10. 306-0700
- ★ Sofa, 86", beige, w/matching loveseat w/back and arm covers, \$350. 881-3661
- ★ Oak dining set, table w/leaf, six chairs, 4 chair covers, \$70. 461-7751
- ★ Palm V accessories kit, modem, charger, wireless web, GSM upgrade, carrying cases, \$20. 772-8489
- ★ AKC pugs, one male, one female, fawn w/black masks, first shots, dewormed, \$450. 880-2037
- ★ Nikon zoom lens, 70-200 2.8F, caps, UV filter, container included, \$690. 551-1007 after 6 p.m.
- ★ Reel-to-reel tape recorder/player, \$100; music tapes for same, 75 cents each. 837-6776
- ★ Heil 3-ton heat pump central unit. 256-883-5778
- ★ Fender standard Stratocaster, blue w/white, pickguard, flame maple neck and fingerboard, \$275. 325-8377
- ★ Alan Jackson/Martina McBride concert tickets, two pair, Oak Mountain, May 20. 464-9014
- ★ Magic Chef side-by-side refrigerator. 233-4892
- ★ Golf carts: Agogo 3-wheel push w/handbrake, \$85; BagBoy Advantage & Lite. \$25 ea. 256-534-7913
- ★ Hummingbird 300TX Tri-Beam depth/fish finder, \$150. 837-4136
- ★ Reece fifth-wheel hitch, 15K, new mounting hardware, \$150. 931-732-4742
- ★ Murray riding lawn mower, 12.5HP, 40", w/rear bagger kit, \$375. 864-0483
- ★ La-Z-Boy "Emotion" overstuffed rocker/recliner, two yrs. old, w/fabric guard protection, \$300. 837-0705
- ★ Pro-Sport foosball table, butcher block style, \$150. 256-864-2337
- ★ Sofa w/matching loveseat, beige, back and end cushions, arm covers. 256-881-3661
- ★ Crinum lily bulbs, wine and milk & wine, \$2 per-inch of diameter. 256-586-

- 5126
- ★ Antique Oak desk w/matching chair, wingback blue chair; wingback rust chair w/Queen Anne legs. 256-837-0786
- ★ Various pond/aquarium fish up to 8", \$2 or less; lawn drop spreader, \$7. 828-6213
- ★ La-Z-Boy matching sofa & loveseat, blue cloth, 7 yrs. old, \$450 for both. 655-3065
- ★ Palm pilot, Palm IIIxe w/manual, software and cradle, \$30. 880-6146
- ★ Black IR wireless keyboard w/built-in mouse, \$20; Microsoft natural keyboard Pro, \$5. 765-532-4218
- ★ Crystal table lamps w/white shades, \$25 for pair. 256-895-2959
- ★ King-size bed, headboard, frame and mattress set, \$80. 880-4915
- ★ Antique organ, \$800. 256-837-3732
- ★ Weight bench w/Olympic weight set, \$100; Schwinn bicycle, upright handle-bars, \$20. 656-2951
- ★ Lego play table, \$50; bicycle child carrier, \$25. 881-3527

Vehicles

- ★ 1971 VW Westfalia camper, all original, 4-speed, new tires, rebuilt motor. 256-739-4734
- ★ 1991 GMC Sonoma, 56K actual miles, 4.3/V6, auto, air, \$4,950. 837-1774
- ★ 1989 Honda CR250R dirt bike, make offer; 1996 Honda XR100 dirt bike, make offer. 655-6293
- ★ 300 Polaris Xpress ATV, \$2,000. 881-9753
- ★ 1991 Explorer XLT, 4-door, leather, sunroof, 64K miles, \$3,000+ in new parts, \$3,700. 880-6498
- ★ 1968 Chevy truck, 350/automatic, 95 percent restored, white on white new wood bed, \$6,500. 679-0694
- ★ 1996 Dodge Interpid ES, all-power, cold air, \$5,000. 256-878-0124
- ★ 1991 Ford Crown Victoria, runs well, \$800. 723-2462
- ★ 2000 Saturn SL1, auto, PS, 70K miles, non-smoker, \$4,500. 325-6000
- ★ 1997 Buick LaSabre, custom, 4-door, 148K miles, \$4,300. 256-773-7730

- ★ 1993 Nissan Maxima SE, 152K miles, Pioneer CD changer, second owner, all records, \$2,950. 256-931-2868
- ★ 1999 Suzuki Marauder 800cc, dressed out, new Metzler tires, 10K miles, green/black. \$3,200. 776-6949
- ★ 2002 Toyota Tacoma, silver, 4x4, automatic, \$16,000. 585-0473
- ★ 1987 Mazda B2200 p/u, 101K miles, \$1,300. 721-0540
- ★ 1989 Cadillac Fleetwood, all power, 109K miles, one-owner, \$2,500. 256-878-0124
- ★ 1998 Ford Ranger, regular cab, 5-speed, 4-cyl., style-side bed, tow package, 112K miles, \$3,600. 256-431-7321
- ★ 1999 Chevy Tahoe LS, 4-door, 5.7L, w/towing package, 80K miles, \$10,800. 256-773-0068
- ★ 1978 Chevrolet 1/2-ton pickup, 350/4bbl, trailering special suspension/transmission, \$600. 227-0339/Dave
- ★ 1995 Ford Windstar, one-owner, 160K miles, all-power, \$1,950. 256-722-0997
- ★ 1991 GMC Sonoma, 57K actual miles, 4.3/V6, auto/air, \$4,400. 837-1774

Wanted

- ★ Ride to work, near Huntsville Hospital, 7 a.m.-3:30 p.m., \$7 per day. 533-6980
- ★ Scooter or off-road motorcycle in running or non-running condition, any brand. 325-6000
- ★ To trade Classic Blue Longaberger pottery for Classic Red or Green. 651-1531
- ★ Woods 3-point hitch finishing mower, 60", for a tractor. 585-0473

Free

- ★ Industrial ball bearing steel rollers, 33"; steel frames for rollers are also available. 650-5422

Lost

- ★ 35-Year NASA pin, lost on March 29 in Bldg. 4200/4201 area. Call 544-6568, if found

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